



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/613,969	07/03/2003	Louis J. Morales	ISI. P002	6776

7590 06/02/2005

Raymond J. Werner
Suite 525
2092 NW Alclek Drive
Hillsboro, OR 97124

EXAMINER

HAN, YOUNGHUIE JESSICA

ART UNIT PAPER NUMBER

2838

DATE MAILED: 06/02/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/613,969

Applicant(s)

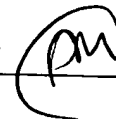
MORALES, LOUIS J.

Examiner

Y. J. Han

Art Unit

2838



-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 10 March 2005.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-6,8 and 11 is/are pending in the application.
- 4a) Of the above claim(s) 7,9,10 and 12-22 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-6,8 and 11 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 03 July 2003 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Election/Restrictions

1. Applicant's election without traverse of Species II filed on 3/10/2005 is acknowledged. However, not all claims 1-9, 11-19 and 21-22 read on the elected Species II as indicated by the applicant. For instance, claim 7 and 12-22 are drawn to an invention nonelected species III, Figures 3 and 5-7: an analog implementation. Thus, claims 7, 9, 10, and 12-22 are withdrawn from further consideration by the examiner, as being drawn to a nonelected invention.

Drawings

2. Drawings are objected to because it fails to show "the plurality of circuit elements is disposed within a package that houses the integrated circuit."

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

4. Claims 1-6 and 8 are rejected under 35 U.S.C. 102(e) as being anticipated by Sumiyoshi (2002/0202947). Sumiyoshi discloses an apparatus, comprising: a first circuit (12), disposed within an integrated circuit (1), the first circuit having a first positive supply rail (14) coupled to an output terminal of a regulated power supply (Vs), the first circuit having at least one operating characteristic that is dependent upon the magnitude of a voltage that is supplied at the output

Art Unit: 2838

terminal of the regulated power supply, the first circuit operable to provide a first signal indicative of the at least one operating characteristic at a first output terminal; and a second circuit (2) coupled to the first output terminal of the first circuit, the second circuit adapted to receive a reference clock signal (CLK), the second circuit further adapted to compare the first signal and the reference clock signal and to provide a control signal for controlling the magnitude of the voltage that is supplied at the output terminal of the regulated power supply; wherein the regulated power supply (15), responsive to the second signal, increases or decreases the magnitude of the voltage that is supplied at the output terminal of the regulated power supply, such that at least one operating characteristic of the first circuit is modified to be within a predetermined range.

In re claim 2, the first circuit comprises an inverter chain (12).

In re claim 3, the first circuit comprises a ring oscillator (12).

In re claim 4, the second circuit is disposed within the integrated circuit (1).

In re claim 5, the regulated power supply includes a plurality of circuit elements that are disposed external to the integrated circuit (9, circuits on computer side).

In re claim 6, wherein the plurality of circuit elements is disposed within a package (inherent computer casing) that houses the integrated circuit.

In re claim 8, wherein the at least one operating characteristic of the first circuit is leakage current (inherent in tiny transistors as indicated by applicant in page 1 of the instant specification).

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. Claim 11 is rejected under 35 U.S.C. 103(a) as being unpatentable over Sumiyoshi in view of Lee (6,177,785).

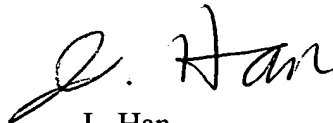
Sumiyoshi discloses the invention substantially as claimed but does not disclose a field programmable gate array. Lee, however, teaches that the use of a programmable voltage regulator circuit having field gate array is well known in the art. Therefore, it would have been obvious to one having ordinary skill in the art employ such feature to obtain the claimed invention, as taught by Lee, for the purpose of “a voltage regulator circuit having a structure suitable for integration” (col. 1).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Y. J. Han whose telephone number is 571-272-2078. The examiner can normally be reached on Mon-Fri 5:30am-2:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner’s supervisor, Michael Sherry can be reached on 571-272-2084. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Art Unit: 2838

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

A handwritten signature in black ink, appearing to read "J. Han". The signature is fluid and cursive, with the first letter of each name being capitalized and prominent.

J. Han
Primary Examiner
Art Unit 2838